

## **STIC Biotechnology Systems Branch**

### **RAW SEQUENCE LISTING** **ERROR REPORT**

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number: 10/560,605  
Source: IFWP  
Date Processed by STIC: 9/8/06

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.

PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION AND PATENTIN SOFTWARE QUESTIONS, PLEASE CONTACT MARK SPENCER, TELEPHONE: 571-272-2510; FAX: 571-273-0221

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE **CHECKER VERSION 4.4.0 PROGRAM**, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW FOR ADDRESS:

**<http://www.uspto.gov/web/offices/pac/checker/chkrnote.htm>**

Applicants submitting genetic sequence information electronically on diskette or CD-Rom should be aware that there is a possibility that the disk/CD-Rom may have been affected by treatment given to all incoming mail.

Please consider using alternate methods of submission for the disk/CD-Rom or replacement disk/CD-Rom.

Any reply including a sequence listing in electronic form should NOT be sent to the 20231 zip code address for the United States Patent and Trademark Office, and instead should be sent via the following to the indicated addresses:

1. EFS-Bio (<**<http://www.uspto.gov/ebc/efs/downloads/documents.htm>**> , EFS Submission User Manual - ePAVE)
2. U.S. Postal Service: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450
3. Hand Carry, Federal Express, United Parcel Service, or other delivery service (EFFECTIVE 01/14/05):  
U.S. Patent and Trademark Office, Mail Stop Sequence, Customer Window, Randolph Building, 401 Dulany Street, Alexandria, VA 22314

Revised 01/10/06

## Raw Sequence Listing Error Summary

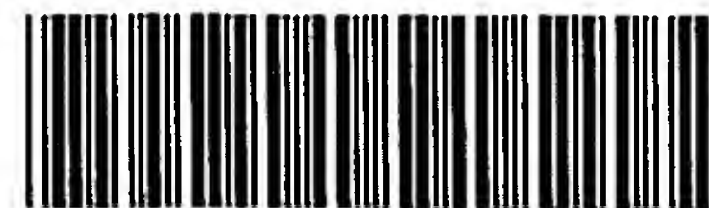
### ERROR DETECTED

### SUGGESTED CORRECTION

SERIAL NUMBER: 10/560,605

ATTN: NEW RULES CASES: PLEASE DISREGARD ENGLISH "ALPHA" HEADERS, WHICH WERE INSERTED BY PTO SOFTWARE

- 1        Wrapped Nucleics  
    Wrapped Aminos     The number/text at the end of each line "wrapped" down to the next line. This may occur if your file was retrieved in a word processor **after** creating it. Please adjust your right margin to .3; this will prevent "wrapping."
  
- 2        Invalid Line Length     The rules require that a line **not exceed** 72 characters in length. This includes white spaces.
  
- 3        Misaligned Amino  
    Numbering     The numbering under each 5<sup>th</sup> amino acid is misaligned. Do **not** use tab codes between numbers; use **space characters**, instead.
  
- 4        Non-ASCII     The submitted file was **not** saved in ASCII(DOS) text, as **required** by the Sequence Rules. **Please ensure your subsequent submission is saved in ASCII text.**
  
- 5        Variable Length     Sequence(s)        contain n's or Xaa's representing more than one residue. **Per Sequence Rules, each n or Xaa can only represent a single residue.** Please present the **maximum** number of each residue having variable length and indicate in the <220>-<223> section that some may be missing.
  
- 6        PatentIn 2.0  
    "bug"     A "bug" in PatentIn version 2.0 has caused the <220>-<223> section to be missing from amino acid sequences(s)       . Normally, PatentIn would automatically generate this section from the previously coded nucleic acid sequence. Please manually copy the relevant <220>-<223> section to the subsequent amino acid sequence. **This applies to the mandatory <220>-<223> sections for Artificial or Unknown sequences.**
  
- 7        Skipped Sequences  
    (OLD RULES)     Sequence(s)        missing. If intentional, please insert the following lines for **each** skipped sequence:  
                    (2) INFORMATION FOR SEQ ID NO:X: (insert SEQ ID NO where "X" is shown)  
                    (i)     SEQUENCE CHARACTERISTICS: (Do not insert any subheadings under this heading)  
                    (xi)  SEQUENCE DESCRIPTION:SEQ ID NO:X: (insert SEQ ID NO where "X" is shown)  
                    This sequence is intentionally skipped  
                    Please also adjust the "(ii) NUMBER OF SEQUENCES:" response to **include** the skipped sequences.
  
- 8        Skipped Sequences  
    (NEW RULES)     Sequence(s)        missing. If **intentional**, please insert the following lines for **each** skipped sequence.  
                    <210> sequence id number  
                    <400> sequence id number  
                    000
  
- 9        Use of n's or Xaa's  
    (NEW RULES)     Use of n's and/or Xaa's have been detected in the Sequence Listing.  
                    Per 1.823 of Sequence Rules, use of <220>-<223> is **MANDATORY** if n's or Xaa's are present.  
                    In <220> to <223> section, please explain location of **n** or **Xaa**, and which residue **n** or **Xaa** represents.
  
- 10        Invalid <213>  
    Response     Per 1.823 of Sequence Rules, the only **valid** <213> responses are: Unknown, Artificial Sequence, or scientific name (Genus/species). <220>-<223> section is **required** when <213> response is Unknown or is Artificial Sequence. (see item 11 below)
  
- 11        Use of <220>     Sequence(s)        missing the <220> "Feature" and associated numeric identifiers and responses. Use of <220> to <223> is **MANDATORY** if <213> "Organism" response is "Artificial Sequence" or "Unknown."  
                    Please explain source of genetic material in <220> to <223> section or use "chemically synthesized" as explanation. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32), also Sec. 1.823 of Sequence Rules
  
- 12        PatentIn 2.0  
    "bug"     Please do not use "Copy to Disk" function of PatentIn version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence listing). Instead, please use "File Manager" or any other manual means to copy file to floppy disk.
  
- 13        Misuse of n/Xaa     "**n**" can **only** represent a single nucleotide; "**Xaa**" can **only** represent a single amino acid



IFWP

## RAW SEQUENCE LISTING

DATE: 09/08/2006

PATENT APPLICATION: US/10/560,605

TIME: 13:36:44

Input Set : A:\Sequence Listing.txt

Output Set: N:\CRF4\09082006\J560605.raw

5 <110> APPLICANT: Indian Council of Medical Research  
 7 University of Delhi  
 11 <120> TITLE OF INVENTION: Mutants of Mycobacteria and process thereof  
 15 <130> FILE REFERENCE: 11378.0066USWO  
 17 <140> CURRENT APPLICATION NUMBER: US 10/560,605  
 18 <141> CURRENT FILING DATE: 2005-12-13  
 20 <150> PRIOR APPLICATION NUMBER: PCT/IN2004/000203  
 21 <151> PRIOR FILING DATE: 2004-07-09  
 24 <150> PRIOR APPLICATION NUMBER: IP882/DEL/2003  
 25 <151> PRIOR FILING DATE: 2003-07-09  
 29 <160> NUMBER OF SEQ ID NOS: 16  
 33 <170> SOFTWARE: PatentIn version 3.1  
 37 <210> SEQ ID NO: 1  
 39 <211> LENGTH: 32  
 41 <212> TYPE: DNA  
 43 <213> ORGANISM: Artificial Sequence  
 47 <220> FEATURE:  
 49 <223> OTHER INFORMATION: The primer was synthesized  
 51 <400> SEQUENCE: 1  
 52 ccacatcatgac gtcgtctgac aacggagcgt cc 32  
 55 <210> SEQ ID NO: 2  
 57 <211> LENGTH: 32  
 59 <212> TYPE: DNA  
 61 <213> ORGANISM: Synthesized  
 65 <400> SEQUENCE: 2  
 66 gggcatatgg caacaccccg gccgcccgt cg 32  
 69 <210> SEQ ID NO: 3  
 71 <211> LENGTH: 33  
 73 <212> TYPE: DNA  
 75 <213> ORGANISM: Synthesized  
 79 <400> SEQUENCE: 3  
 80 gggcatatga cgctcggctg ttgcggcagc tcg 33  
 83 <210> SEQ ID NO: 4  
 85 <211> LENGTH: 32  
 87 <212> TYPE: DNA  
 89 <213> ORGANISM: Synthesized  
 93 <400> SEQUENCE: 4  
 94 ccacatcatgac ggtggctggc cccgcggtgc gg 32  
 97 <210> SEQ ID NO: 5  
 99 <211> LENGTH: 33  
 101 <212> TYPE: DNA  
 103 <213> ORGANISM: Synthesized  
 107 <400> SEQUENCE: 5

see pp 1-2  
 Does Not Comply  
 Corrected Diskette Needed

invalid <213> response  
 (see item 10 on Error Summary Sheet)

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Input Set : A:\Sequence Listing.txt

Output Set: N:\CRF4\09082006\J560605.raw

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108 ccatcatgac tgtggaacct attcctgtcg gcc 33
111 <210> SEQ ID NO: 6
113 <211> LENGTH: 36
115 <212> TYPE: DNA
117 <213> ORGANISM: Synthesized
121 <400> SEQUENCE: 6
122 gggcatatgg gctggattcg ccggctattc ctgtcg 36
125 <210> SEQ ID NO: 7
127 <211> LENGTH: 33
129 <212> TYPE: DNA
131 <213> ORGANISM: Synthesized
135 <400> SEQUENCE: 7
136 gggcatatgg gtgctcacc actgcttcgc ggg 33
139 <210> SEQ ID NO: 8
141 <211> LENGTH: 33
143 <212> TYPE: DNA
145 <213> ORGANISM: Synthesized
149 <400> SEQUENCE: 8
150 ccatcatgag tcggtgaccc ccgtatagcc cgg 33
153 <210> SEQ ID NO: 9
155 <211> LENGTH: 28
157 <212> TYPE: DNA
159 <213> ORGANISM: Synthesized
163 <400> SEQUENCE: 9
164 ggcataatggc tgtccgtgaa ctgccggc 28
167 <210> SEQ ID NO: 10
169 <211> LENGTH: 35
171 <212> TYPE: DNA
173 <213> ORGANISM: Synthesized
177 <400> SEQUENCE: 10
178 ggacgcgttc atccgagcag caccgccgc atccg 35
181 <210> SEQ ID NO: 11
183 <211> LENGTH: 492
185 <212> TYPE: DNA
187 <213> ORGANISM: Mycobacterium tuberculosis
191 <400> SEQUENCE: 11
192 gtgtctgatc cgctgcacgt cacattcggt tgtacgggca acatctgccg gtcgccaatg 60
194 gccgagaaga tggtcgccca acagcttcgc caccgtggcc tgggtgacgc ggtgcgagtg 120
196 accagtgcgg gcaccgggaa ctggcatgta ggcagttgcg ccgacgagcg ggcggccggg 180
198 gtgttgcgag ccacaggcta ccctaccgac caccgggccg cacaagtcgg caccgaacac 240
200 ctggcggcag acctgttggt ggccttgga cgcgaaccac ctcggctgtt gcggcagctc 300
202 ggcgtcgaag ccgcccgggt acggatgctg cggtcattcg acccagctc gggaacccat 360
204 gcgctcgatg tcgaggatcc ctactatggc gatcactccg acttcgagga ggtcttcgcc 420
206 gtcacgaat ccgccctgcc cggcctgcac gactgggtcg acgaacgtct cgcgcggaac 480
208 ggaccgagtt ga 492
211 <210> SEQ ID NO: 12
213 <211> LENGTH: 831
215 <212> TYPE: DNA
217 <213> ORGANISM: Mycobacterium tuberculosis

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Input Set : A:\Sequence Listing.txt

Output Set: N:\CRF4\09082006\J560605.raw

221 &lt;400&gt; SEQUENCE: 12

222	tcattccgagc	agcacccccgc	gcatccgggtt	gactgtggcc	tggttgatac	cggcgtcgcg	60
224	caggtagccg	cccagcgatc	cgtaggtctc	gtcaatggtc	tggtgtgcgg	cggccaggta	120
226	ctccgcgcgg	acaccagga	ccccgtcgga	cagccgggcc	ttggtgaacg	tcaccacctc	180
228	gggtgccagt	tcggtgtcga	aacgctgctg	gatcatctcg	gagatccggg	cccgcagttg	240
230	tggtcacggag	tcgttgctgc	gcaggtagtc	ggcgacgatg	acgtcgcggt	ccaggccgac	300
232	cggttcaagc	accagcgcca	ccacgaagcc	ggtgcgatcc	ttaccgcgca	agcagtgggt	360
234	gagcaccggg	cgtccggcgg	caagcagtgt	gacgacacga	tgtagcgcgc	gctgtgctcc	420
236	attgcgcgtt	gggaattggc	gatactcgtc	ggtcatgtag	cgggtggccg	cgtcatttat	480
238	cgactggctg	gattcgccgg	actcgccgtt	ggaccgcgta	ttggttagca	gcctcttgaa	540
240	tgcggtttctg	tgcggcgctg	agtcgtcggc	gtcatcatcg	gcgaggctcg	ggaacggcag	600
242	caggtggacg	tcgatgccgt	ccggaacccg	tcctggaccg	cggcgggcaa	cctcccggga	660
244	cgaccgcagg	tcggcaacgt	cggtgatccc	cagccggcgc	agcgttgccc	ggccggcgctc	720
246	gtcgaggcgg	ctcagctcgc	tggaccggaa	cagccgcccc	ggccgcaatg	cggttgcggt	780
248	gtcggcgacg	tcacgaaagt	tccacgcgcc	cggcagttca	cggacagcca	t	831

251 &lt;210&gt; SEQ ID NO: 13

253 &lt;211&gt; LENGTH: 2531

255 &lt;212&gt; TYPE: DNA

257 &lt;213&gt; ORGANISM: Mycobacterium tuberculosis

261 &lt;400&gt; SEQUENCE: 13

262	cgctgtctga	caacggagcg	tccaaatcgt	cgggcacgcg	gtacacgcca	tggtcaatgc	60
264	ctaaccgccg	agtctcatga	ggatgcagcg	gcacaagctt	tgctaccggc	tcgccgcggc	120
266	gggcaatctc	aacctctgcc	cgccgtagac	gagccgcagc	agctcggaca	ggcgtgtctt	180
268	cgctcgtga	acgccgaccc	gcttcgcagg	cgcccagact	ttcgcgctga	ccacctgctc	240
270	accaaacttc	gcgatcatcg	cctgatacca	cagcgccaac	gggtagcggt	ttgtccaacc	300
272	gcttcgtcaa	cgacaatggg	atcgtgaccg	acacgaccgc	gagcgggacc	aattgcccgc	360
274	ctcctccacg	cgccgccgca	cggcgcgcat	cgctcgccgg	tgaatcgccg	cagctgggtga	420
276	tcttcgatct	ggacggcacg	ctgaccgact	cggcgcgccg	aatcgtatcc	agcttccgac	480
278	acgcgctcaa	ccacatcggt	gccccagtac	ccgaaggcga	cctggccact	cacatcgctg	540
280	gcccccccat	gcatgagacg	ctgcgcgcca	tggggctcgg	cgaatccgcc	gaggaggcga	600
282	tcgtagccta	ccgggccgac	tacagcgccc	gcggttgggc	gatgaacagc	ttgttcgacg	660
284	ggatcgggcc	gctgctggcc	gacctgcgca	ccgccggtgt	ccggctggcc	gtcgccacct	720
286	ccaaggcaga	gccgaccgca	cggcgaatcc	tgcgccactt	cggaattgag	cagcacttcg	780
288	aggtcatcgc	gggcgcgagc	accgatggct	cgcgaggcag	caaggctcag	gtgctggccc	840
290	acgcgctcgc	gcagctgcgg	ccgctacccg	agcggttggt	gatggctcgg	gaccgcagcc	900
292	acgacgtcga	cggggcgggc	gcgcacggca	tcgacacggt	ggtggctcgg	tggggctacg	960
294	ggcgcgccga	ctttatcgac	aagacctcca	ccaccgtcgt	gacgcatgcc	gccacgattg	1020
296	acgagctgag	ggaggcgcta	ggtgtctgat	ccgctgcacg	tcacattcgt	ttgtacgggc	1080
298	aacatctgcc	ggtcgccaat	ggccgagaag	atgttcgccc	aacagcttcg	ccaccgtggc	1140
300	ctgggtgacg	cgggtgcgag	gaccagtgcg	ggcaccggga	actggcatgt	aggcagttgc	1200
302	gccgacgagc	gggcggcccg	ggtgttgcca	gcccacggct	acgctcggct	gttgccggcag	1260
304	ctcggcgctc	aagccgcccc	ggtacggatg	ctgcggtcat	tcgacccacg	ctcgggaacc	1320
306	catgcgctcg	atgtcgagga	tccctactat	ggcgatcact	ccgacttcga	ggaggctctc	1380
308	gccgtcatcg	aatccgccct	gcccggcctg	cacgactggg	tcgacgaacg	tctcgcgccg	1440
310	aacggaccga	gttgatgccc	cgcctagcgt	tcctgctgcg	gcccggctgg	ctggcgcttg	1500
312	ccctggctcg	ggtcgcgctt	acctacctgt	gctttacggt	gctcgcgccg	tggcagctgg	1560
314	gcaagaatgc	caaaacgtca	cgagagaacc	agcagatcag	gtattccctc	gacaccccgc	1620
316	cggttccgct	gaaaaccctt	ctaccacagc	aggattcgct	ggcgccggac	gcgcagtggc	1680
318	gccgggtgac	ggcaaccgga	cagtaccttc	cggacgtgca	ggtgctggcc	cgactgcgcg	1740



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Input Set : A:\Sequence Listing.txt

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320 tgggtggaggg ggaccaggcg tttgaggtgt tggccccatt cgtggtcgac ggcggaacaa 1800
322 ccgtcctggt cgaccgtgga tacgtgcggc cccagggtggg ctgcgcacgta ccaccgatcc 1860
324 cccgcctgcc ggtgcagacg gtgaccatca ccgcgcggct gcgtgactcc gaaccgagcg 1920
326 tggcgggcaa agacccattc gtcagagacg gcttcacgca ggtgtattcg atcaataaccg 1980
328 gacaggtcgc cgcgctgacc ggagtccagc tggctgggtc ctatctgcag ttgatcgaag 2040
330 accaaccgcg cgggctcggc gtgctcggcg ttccgcctct agatcccggg ccgttcctgt 2100
332 cctatggcat ccaatggatc tcgttcggca ttctggcacc gatcggtctg ggctatttcg 2160
334 cctacgccga gatccgggcg cgccgccggg aaaaagcggg gtcgccacca ccggacaagc 2220
336 caatgacggt cgagcagaaa ctcgctgacc gctacggccg ccggcggtaa accaacatca 2280
338 cggccaatac cgcagccccc gcctggacca cccgcgacag caccacggcg cggcgcagat 2340
340 cggccacctt gggcgaccgg ccgtcgccca aggtgggccc gatctgcaac tcatggtggt 2400
342 accgggtggg cccaccacgc cgcacgtcaa gcgccccagc aaacgccgcc tcgacgacac 2460
344 cggcggtggg gctgggatgg cgggcggcgt cgcgccgcca ggcccgtacc gcaccgcggg 2520
346 gcgacccacc g

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349 &lt;210&gt; SEQ ID NO: 14

351 &lt;211&gt; LENGTH: 2890

353 &lt;212&gt; TYPE: DNA

355 &lt;213&gt; ORGANISM: Mycobacterium tuberculosis

359 &lt;400&gt; SEQUENCE: 14

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360 gtcggtgacc cccgtatagc ccggcgacgt cggtaattta gtagcgcctt cgacctgcgc 60
362 gggcgtgagg tccaaatact tgggtgtgtac gaatgtgatg cctgcaaccg cgttgaggtc 120
364 ggaaatgaag ttgagcgggt atcgcgagaa gtcggcgaac ccgtcgtact cgagcgtgta 180
366 gatggccgtc ggatagatcg tgtccgaggg cgttgcgcca tagaacgtca ggtccagagt 240
368 cggaagcgtc agatccggga accgcgcgag cataccgcca ttgggggttca tttcattgcc 300
370 gacaagcacg aaattgaggt cgctcgccga aggtgcggcc ccgcccacgt ccgtgaacct 360
372 ctgcatctcc agcgacgcga ttatggcgct ttgcgaccag ccgaaaacgg tgaccgcgctt 420
374 tccggtggtc gcgagctcta ccatgatcgc gtcgtgcaag atggtcaagc cctcttccac 480
376 tgacgtgttg aggaccaaac ttctgacacc ggtgagtggg tacaactctt cgggtgtgaa 540
378 gacggcttgt agcgcccgcg gaacggacct acagcgtatt ggcggcgtca acatagacgg 600
380 cgggtgtagt ggaattccgg tgggccccaa gaacaagggt gtcaagttcg ccgggaatgg 660
382 cggaatcatc gcggccgcgg cgggggttgg tgcggcggcg ggcacagcca gctgattttg 720
384 ccgggtgctg gcgatggcgg cctcggcata tgcgtagctg ttgcgcgcgg cggccaacgt 780
386 ctggtggaac ctaactgtga aacgcctcga cttgagcgag cacggcctgg tattcctggc 840
388 cgtatgcgcc gaacgggtttc gcgatggcgg ccgacacctc atcgccggcc gccgcggcca 900
390 gtgcacacgt cgggcctgcc gcggccgcgc cggccgtact cacggccgaa ccgattcctg 960
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396 gcggtcccgc tgccctgggt gtcgcttacg cgaatcggat tcgcgcgaaa gcgtttcccc 1140
398 tcatccgagc agcaccgccg gcattccggt gactgtggcc tggctgatac cggcgtcgcg 1200
400 caggtagccg cccagcgatc cgtaggtctc gtcaatgggt tggcgtgcgg cggccaggta 1260
402 ctccgcgcgg acaccagga ccccgctcga cagccgggccc ttggtgaacg tcaccacctc 1320
404 ggggtgccagt tcggtgtcga aacgctgctg gatcatctcg gagatccggg cccgcagttg 1380
406 tggcacggag tcgttgctgc gcaggtagtc ggcgacgatg acgtcgcggt ccaggccgac 1440
408 cgcttcaagc accagcgcg ccacgaagcc ggtgcgatcc ttaccgcgca agcagtgggg 1500
410 gctggattcg ccggactcgc cgttggaccc gtcattgggt agcagcctct tgaatgcggt 1560
412 ttcgtgcggc gctgagtcgt cggcgtcatc atcggcgagg tcggggaacg gcagcaggtg 1620
414 gacgtcgatg ccgtccggaa cccgtcctgg accgcggcgg gcaacctccc gggacgaccg 1680
416 caggtcggca acgtcgggtg tccccagccg gcgcagcgtt gcccggcggc cgtcgtcgag 1740
418 gcggctcagc tcgctggacc ggaacagccg ccccggcgcg aatgcggttg cgggtgcggc 1800

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Input Set : A:\Sequence Listing.txt

Output Set: N:\CRF4\09082006\J560605.raw

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424 cgtcgggacc gtcgaagatg cgcattggcg ggtgccagcc gtacaaccgg gccagcgggg 1980
426 tgtcgctcgt gacgccggcg gcccgtgga cctggattgc gcggtcgatg acatcgagg 2040
428 ccacccgcgg ggccaccgcc ttgatcatgg cgaccagggt gcgcgcctct ttgttgccat 2100
430 gttggtcgat tgtccacgcc gctttttcgc acagcagcct tgcctggtcg atttcgttgc 2160
432 gggactgagc aatcgccctgt tgcacgacgc cctgttcggc taacggagcg ccgaacgcca 2220
434 cccggttgcg gacgcgattc accatgagtg ccaaggcgcg ttcggccgcg cccagcgcac 2280
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440 ggccgtgccg gtcctgccag ccgaacaccg gtgtggagcg aacgatcgtc acgccggggg 2460
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448 cgctgctggc caccgccggc tcggtcacg agaaggcgct gcggatcttg ccgtcgagca 2700
450 gcggccgcag ccattgcgcc cgttgctgct cggtgccgaa catgtgcagg atctccatgt 2760
452 tgccggtgtc cgggtgcggcg cagttgagtg cctcgggcgc gatttccatg ctccatccgg 2820
454 tcatttcggc cagcggcgcg tactccaggt tggccaatcc cgactcggcc gacaggaata 2880
456 ggttccacag 2890

```

459 &lt;210&gt; SEQ ID NO: 15

461 &lt;211&gt; LENGTH: 4163

463 &lt;212&gt; TYPE: DNA

465 &lt;213&gt; ORGANISM: Artificial sequence

469 &lt;220&gt; FEATURE:

471 &lt;223&gt; OTHER INFORMATION: The sequence was produced in the lab

473 &lt;400&gt; SEQUENCE: 15

```

474 cgctcgtctga caacggagcg tccaaatcgt cgggcacgcg gtacacgcca tggccaatgc 60
476 ctaaccgccg agtctcatga ggatgcagcg gcacaagctt tgctaccggc tcgccgcggc 120
478 gggcaatctc aacctctgcc cgccgtagac gagccgcagc agctcggaca ggctgtctt 180
480 cgctcgtga acgccgaccc gcttcgcagg cgccagact ttcgcgtcga ccacctgctc 240
482 accaaacttc gcgatcatcg cctgatacca cagcgccaac gggtagcggt ttgtccaacc 300
484 gcttcgtcaa cgacaatggg atcgtgaccg acacgaccgc gagcgggacc aattgcccgc 360
486 ctctccacg cgccgccgca cggcgcgcat cgctcggcgg tgaatcgccg cagctgggtg 420
488 tcttcgatct ggacggcacg ctgaccgact cggcgcgcgg aatcgatatc agcttccgac 480
490 acgcgctcaa ccacatcggt gcccagtag ccgaaggcga cctggccact cacatcgtcg 540
492 gccgcccac gcatgagacg ctgcgcgcca tggggctcgg cgaatccgcc gaggaggcga 600
494 tcgtagccta ccggggccgac tacagcgccc gcggttgggc gatgaacagc ttgttcgacg 660
496 ggatcgggcc gctgctggcc gacctgcgca ccgccggtgt ccggctggcc gtcgccacct 720
498 ccaaggcaga gccgaccgca cggcgaatcc tgcgccactt cggaattgag cagcacttcg 780
500 aggtcatcgc gggcgcgagc accgatggct cgcgaggcag caaggtcgac gtgctggccc 840
502 acgcgctcgc gcagctgcgg ccgctaccgg agcgggttgg gatggtcggc gaccgcagcc 900
504 acgacgtcga cggggcgggc gcgcacggca tcgacacggt ggtggtcggc tggggctacg 960
506 ggcgcgccga ctttatcgac aagacctcca ccaccgtcgt gacgcatgcc gccacgattg 1020
508 acgagctgag ggaggcgcta ggtgtctgat ccgctgcacg tcacattcgt ttgtacgggc 1080
510 aacatctgcc ggtcgccaat ggccgagaag atgttcgccc aacagcttcg ccaccgtggc 1140
512 ctgggtgacg cgggtgcgagt gaccagtgcg ggcaccggga actggcatgt aggcagttgc 1200
514 gccgacgagc gggcgccggg ggtgttgcca gccacggct tctagaggat ccccggttac 1260
516 caagccctcg gcgacgttcc gccgggcctc ggcgaccgcc gcgtcgaggc gccggtcgga 1320
518 ggggcagtc tccacgggca gctcgtggag ggcgcggggc agctccgcca tcgcctcgac 1380

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**VERIFICATION SUMMARY**

**PATENT APPLICATION: US/10/560,605**

**DATE: 09/08/2006**

**TIME: 13:36:45**

**Input Set : A:\Sequence Listing.txt**

**Output Set: N:\CRF4\09082006\J560605.raw**